

REMARKS

This is in response to the Office Action mailed on March 3, 2011. An RCE is being filed along with this amendment. Claims 1, 4, 7-9, 13-17, 20-21, 29-33, and 44-51 were pending in that action and all claims were rejected. With the present response, claims 1, 4, 7-9, 13-14, 16-17, 32-33, 44, 45-48, and 51 are amended, and the remaining claims are unchanged. Consideration and allowance of all pending claims are respectfully solicited in light of the following comments.

35 USC §101 Rejection

On page 3 of the Office Action, the Examiner rejected claim 32 under 35 USC §101 as being directed to non-statutory subject matter. Applicant has amended claim 32 to recite a “computer program storage medium.” As is described for example on page 2, lines 12-17 of Applicant’s specification, “[i]n some implementations, articles of manufacture are provided as computer program products. One implementation of a computer program product provides a computer program storage medium readable by a computer system and encoding a computer program. Another implementation of a computer program product may be provided in a computer data signal embodied in a carrier wave by a computing system and encoding the computer program” (emphasis added).

Accordingly, Applicant has amended the claim to be directed to the tangible, non-transitory “computer program storage medium,” instead of being directed to the intangible, transitory “computer data signal,” which is embodied in a carrier wave. Applicant therefore respectfully contends that amended claim 32 satisfies the requirements of 35 USC §101, and Applicant respectfully requests that the 35 USC §101 rejection be withdrawn.

35 USC §102 and §103 Rejections

On pages 3-4 of the Office Action, the Examiner rejected claims 33 and 46 under 35 USC §102 as being anticipated by Yoshihiro et al. Japanese Patent No. 2000-196934 (hereinafter “Yoshihiro”). On pages 5-7 of the Office Action, the Examiner rejected claims 1, 7, 15, 17, 30-32, 44-45, and 49-51 35 USC §103 as being unpatentable over Yoshihiro in view of Lemelson U.S. Pat. No. 4,901,096 (hereinafter “Lemelson”). On pages 7-8 of the Office Action, the

Examiner rejected claims 4, 8, 20, and 47 under 35 USC §103 as being unpatentable over Yoshihiro in view of Lemelson and in further view of Ishibashi U.S. Pat. No. 6,558,050 (hereinafter “Ishibashi”). On pages 8-9 of the Office Action, the Examiner rejected claims 5-6 and 21-22 under 35 USC §103 as being unpatentable over Yoshihiro in view of Lemelson and in further view of Horimoto U.S. Pat. No. 4,009,943 (hereinafter “Horimoto”), and on page 9 of the Office Action, the Examiner rejected claims 9, 16, and 48 under 35 USC §103 as being unpatentable over Yoshihiro in view of Lemelson and in further view of Moultrie Jr. U.S. Pat. Pub. No. 2002/0159770 (hereinafter “Moultrie”). As is discussed below, Applicant respectfully contends that the claims include limitations and combinations of limitations that are not anticipated by or obvious in view of the cited references. Accordingly, Applicant respectfully contends that the claims are patentable and respectfully requests that the rejections be withdrawn.

Claim 1:

Claim 1 has been amended to recite that the portable recall device comprises “a plurality of environmental sensors adapted to monitor multiple ambient conditions” and that “the controller determin[es] whether to capture an image using the camera based at least in part on whether a change in one of the multiple ambient conditions is detected.” The claim amendment is well-supported throughout the application as originally filed. The amendment is supported for example by FIGS. 1-2, by page 4, lines 22-22 of the specification, by page 6, lines 6-24 of the specification, and by page 9, lines 5-20 of the specification. For instance, page 9, lines 15-20 of the specification states that: “Other exemplary capture conditions may be satisfied by a change in sound level, a change in light level, a change in motion (e.g., as detected by an accelerometer or gyroscope), a change in heart rate, a change in ambient temperature or the wear's body temperature, a change in chemical composition of local environment (e.g., air), detection of a Wi-Fi signal, detection of an RFID transponder, or expiration of a real time clock period.”

In rejecting claim 1 on page 5 of the Office Action, the Examiner stated that the previously claimed environmental sensor is disclosed by the abstract and by paragraphs 40-42 of Yoshihiro. Applicant respectfully contends that amended claim 1 is patentably distinguishable from Yoshihiro.

The abstract and paragraphs 40-42 of Yoshihiro describe an image pick-up device. The device monitors a luminance of an object and picks-up an image of the object upon the luminance changing. For instance, the Yoshihiro abstract states that: “The image pickup device monitors the luminance of the mark 45 and, when the luminance changes beyond a threshold picks up the image of the person by operating a shutter. When the photographer 43 conceals the mark 45 after the mark 45 is brought in the visual field of the image pickup device (b), the device picks up the image, because the luminance of the mark 45 changes beyond the threshold.”

In light of the above, Yoshihiro may arguably under a broad interpretation disclose an environmental sensor. For instance, the Yoshihiro image pick-up device that monitors the luminance of a mark could perhaps be viewed as being an environmental sensor. However, as amended, claim 1 recites that the portable recall device comprises a plurality of environmental sensors that monitor multiple ambient conditions, and that the controller determines whether to capture an image based on a change in one of the multiple ambient conditions. Applicant respectfully contends that Yoshihiro does not teach, suggest, or provide any motivation to include such features. For example, assuming for the sake of argument that the Yoshihiro image pick-up device does disclose an environmental sensor and that the Yoshihiro luminance does disclose an ambient condition, Yoshihiro still does not disclose a plurality of environmental sensors that monitor multiple ambient conditions. Instead, Yoshihiro discloses only one pick-up device that monitors one condition (i.e. luminance). Additionally, Yoshihiro does not determine whether an image should be captured/picked-up based on multiple ambient conditions. Yoshihiro instead at most only makes a determination based on the one condition of luminance. Accordingly, Applicant respectfully contends that amended claim 1 is non-obvious in view of Yoshihiro.

For at least the reasons discussed above, Applicant respectfully contends that claim 1 is patentable. Applicant respectfully requests that the rejection be withdrawn and that the claim be allowed.

Claim 17:

Claim 17 has been amended in part to recite “comparing acceleration of the camera in a current monitoring interval to acceleration of the camera in a previous monitoring interval to determine whether a stable condition is satisfied, the stable condition being satisfied by a difference between the acceleration of the camera in the current monitoring interval and the acceleration of the camera in the previous monitoring interval being less than a first threshold value” and “repeating the acceleration monitoring and comparing until the stable condition is satisfied.” The claim amendment is well-supported throughout the application as originally filed. The amendment is supported for example by page 11, lines 1-19 of the specification. For instance, page 11, lines 12-17 of the specification lists pseudocode that includes a step (5) of reading information from an accelerometer in a current monitoring interval and a step (6) of comparing the information from the accelerometer to a previous monitoring interval. In the pseudocode, if a result of the comparison at step (6) exceeds a threshold value, the process is repeated beginning at step (5). If however the result of the comparison at step (6) is less than the threshold value, then the process is continued to step (8) where an image is captured.

In rejecting claim 17 on pages 5-6 of the Office Action, the Examiner stated that the previously claimed detecting a stable condition is disclosed by column 3, lines 12-29 of Lemelson. Applicant respectfully contends that amended claim 17 is patentably distinguishable from Lemelson.

Column 3, lines 12-29 of Lemelson describes a camera that prevents battery power from flowing to and operating a camera's shutter while motion is detected. For instance, Lemelson states that: “If the camera, denoted 10C, is in motion when the manual pushbutton 13P of the switch 13 is depressed to close switch 13, such motion is sensed by a transducer 16, such as an accelerometer or other form of motion sensor, which is energized with electrical energy from battery 12 gated thereto through switch 13, which transmits a sensing signal to the microprocessor 11. Such sensing signal is either processed in the microprocessor 11 to generate a control signal or is applied directly as a control signal to a switching circuit of the microprocessor or a switch external thereof, to retain open or operate same in a manner to

prevent electrical energy from the battery 12 from operating the drive 18 for the shutter mechanism drive motor 17 until sensor 16 fails to sense camera movement whereafter drive 18 is activated, causing motor 17 to power operate shutter mechanism 19 operating the camera shutter 20 to operatively open and close.”

Applicant respectfully contends that Lemelson does not teach, suggest, or provide any motivation to include several of the features recited in amended claim 17. For instance, Lemelson never describes comparing values from two monitoring intervals or using a threshold value. Lemelson also never describes repeating a monitoring and a comparison step. Instead, Lemelson only states that a camera shutter is prevented from operating during motion of the camera. In particular, Applicant would like to point out that the operation of the Lemelson shutter does not depend on any previous interval, state, condition, etc. of the camera. The Lemelson shutter operation only depends on the current state of the camera (i.e. whether it is in motion or not). Accordingly, Applicant respectfully contends that amended claim 17 is clearly distinguishable from and non-obvious in view of Lemelson.

Applicant would like to note that claim 17 has also been amended similarly to claim 1 to recite “a plurality of environmental sensors” that monitor “multiple ambient conditions.” Applicant therefore respectfully contends that amended claim 17 is also patentable for the same reasons mentioned in the claim 1 discussion above.

For at least the reasons discussed above, Applicant respectfully contends that claim 17 is patentable. Applicant respectfully requests that the rejection be withdrawn and that the claim be allowed.

Claim 32:

Claim 32 has been amended to recite that “a change in the at least one ambient condition [is compared] to a lower threshold value and to an upper threshold value” and that “the capture condition [is] satisfied upon either the change being less than the lower threshold value or the change being greater than the upper threshold value.” The claim amendment is well-supported throughout the application as originally filed. The amendment is supported for example by page 10, lines 1-18 of the specification. For instance, page 10, lines 12-18 of the specification lists

pseudocode that includes a step (3) of indicating a capture condition if a current reading is either less than 50% or greater than 200% of the previous reading.

In rejecting claim 32 on page 5 of the Office Action, the Examiner stated that the previously claimed comparing a change in an ambient condition to a first threshold is disclosed by the abstract and by paragraphs 40-42 of Yoshihiro. As mentioned in the claim 1 discussion, Yoshihiro may arguably disclose an ambient condition (i.e. luminance) and a threshold. However, amended claim 32 recites that a change in the ambient condition is compared to both a lower threshold value and to an upper threshold value. Amended claim 32 further recites that the capture condition is satisfied if the change in the ambient condition is either less than the lower threshold value or greater than the upper threshold value. Applicant respectfully contends that Yoshihiro does not disclose such features. For instance, Yoshihiro at most only discloses using one threshold and detecting a change if the luminance is above the one threshold. The abstract of Yoshihiro states for example that: “The image pickup device monitors the luminance of the mark 45 and, when the luminance changes beyond a threshold, picks up the image of the person by operating a shutter” (emphasis added). Accordingly, Applicant respectfully contends that amended claim 32 is non-obvious in view of Yoshihiro.

Applicant would like to note that claim 32 has also been amended similarly to claims 1 and 17 discussed above. For example, amended claim 32 recites “a plurality of environmental sensors” that monitor “multiple ambient conditions.” Also for example, amended claim 32 recites “comparing acceleration of the camera in a current monitoring interval to acceleration of the camera in a previous monitoring interval.” Applicant therefore respectfully contends that amended claim 32 is also patentable for the same reasons mentioned in the claim 1 and 17 discussions above.

For at least the reasons discussed above, Applicant respectfully contends that claim 32 is patentable. Applicant respectfully requests that the rejection be withdrawn and that the claim be allowed.

Claim 33:

Claim 33 has been amended to recite that the digital media player includes “a camera that continuously captures images” and that “the controller sav[es] a portion of the images that corresponds to a change being detected in the at least one ambient condition” and “delet[es] another portion of the images that corresponds to no change being detected in the at least one ambient condition.” The claim amendment is well-supported throughout the application as originally filed. The amendment is supported for example by page 4, lines 23-25 of the specification and by page 12, lines 2-11 of the specification. For instance, page 12, lines 2-11 of the specification states that: “In another implementation, image capture (including video capture) may occur continuously or periodically, even in the absence of a previous capture condition. For example, the recall device detects a stable condition and triggers an image capture to memory. Thereafter, a temporally proximate capture condition is detected so the captured image is maintained in association with the subsequent capture condition. If no temporally proximate capture condition is detected, the captured image may be deleted from memory to manage storage space. In this manner, the environmental conditions existing just prior to a capture event may be captured and efficiently recorded.”

In rejecting claim 33 on pages 3-4 of the Office Action, the Examiner stated that claim 33 is anticipated by Yoshihiro. As mentioned in the claim 1 and 32 discussions above, Yoshihiro discloses an image pick-up device that captures an image of an object based upon the luminance of the object exceeding a threshold. As amended, claim 33 recites that the camera “continuously captures images.” The Yoshihiro pick-up device does not continuously capture images. It instead only captures an image upon a luminance change. Additionally, amended claim 33 recites that a portion of the images are saved and that another portion of the images are deleted. Yoshihiro does not disclose such a feature. Yoshihiro in fact teaches away from the feature in teaching that all images should be saved. For instance, paragraph 20 of Yoshihiro states that: “The flash memory 50 carries out preservation record of image data by which JPEG compression was carried out by graphical data compression/extension part 14.” Accordingly, Applicant

respectfully contends that amended claim 33 is neither anticipated by or obvious in view of Yoshihiro.

Applicant would like to note that claim 33 has also been amended similarly to claim 1 to recite “a plurality of environmental sensors” that monitor “multiple ambient conditions.” Applicant therefore respectfully contends that amended claim 33 is also patentable for the same reasons mentioned in the claim 1 discussion above.

For at least the reasons discussed above, Applicant respectfully contends that claim 33 is patentable. Applicant respectfully requests that the rejection be withdrawn and that the claim be allowed.

Claims 4, 7-9, 13-16, 20-21, 29-31, and 44-51:

Claims 4, 7-9, 13-16, 20-21, 29-31, and 44-51 are dependent claims. The claim 46 amendment is supported for example by page 12, lines 3-12 of the specification. Applicant respectfully contends that the claims are patentable at least based on their dependencies upon the patentable independent claims discussed above. Additionally, in light of the amendments to the independent claims, each of the dependent claims now recites a new combination of limitations that has not been previously considered by the Examiner. Applicant respectfully contends that the new combinations are not taught or suggested by the cited references, and that the claims are therefore patentable based upon their own merits. Applicant respectfully requests that the rejections be withdrawn and that the claims be allowed.

Conclusion

It is respectfully submitted that all claims are now in condition for allowance. Accordingly, consideration and allowance of all pending claims are respectfully solicited. Applicant also respectfully requests that in the event that the Examiner does not find the independent claims patentable, that the Examiner consider allowance of one or more of the dependent claims. The Director is authorized to charge any fee deficiency required by this paper or credit any overpayment to Deposit Account No. 23-1123.

Respectfully submitted,

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